

Amendments to the Claims

1. (original) A data communication system, comprising:
a two-conductor medium;
a plurality of transceivers; and
sets of filters wherein the filters of each set are configured to define a
respective communication channel over said medium and are coupled to
said medium in respective transceivers;
said transceivers thereby enabled to communicate data signals over the
respective communication channels of said sets.
2. (currently amended) The system of claim 1, wherein each of said
transceivers includes:
a transmitter that has an amplifier which couples a filter of each~~and a pair of~~
said sets to said medium to thereby transmit said data signals; and
receivers that are each coupled to said medium by a filter of each of said sets
to thereby receive said data signals
~~one of said pair is a receive set that is coupled to said medium to receive said~~
~~data signals; and~~
~~the other of said pair is a transmit set that is coupled to said medium by said~~
~~amplifier to transmit said data signals.~~
3. (currently amended) The system of claim 2, wherein each of said
transceivers further includes a combiner ~~that couples said transmit set to~~
inserted between said amplifier and said filter of each of said sets.
4. (original) The system of claim 1, wherein the filters of each of said sets
have a passband that defines that set's respective communication channel.
5. (currently amended) The system of claim 4 ~~[[3]]~~, wherein said passband
lies in the frequency region below 1000 megahertz.
6. (currently amended) The system of claim 4 ~~[[3]]~~, wherein said passband
has a width that does not substantially exceed 10 megahertz.

7. (original) The system of claim 1, wherein said two-conductor medium is a coaxial cable.

8. (original) The system of claim 1, wherein said two-conductor medium is a twisted pair.

9. (original) The system of claim 1, wherein said medium comprises a plurality of medium branches and further including at least one hub transceiver that couples said branches together and amplifies said data signals.

10. (original) A communication system for communicating data signals over a plurality of different communication channels, comprising:

a two-conductor medium; and

a plurality of transceivers that each include:

a) a receiver which has a group of receive filters coupled to receive data signals from said medium; and

b) a transmitter which has a group of transmit filters and an amplifier coupled to transmit data signals from said transmit filters to said medium;

wherein said receive and transmit filters have passbands that are positioned to define said different communication channels.

11. (original) The system of claim 10, wherein said passbands lie in the frequency region below 1000 megahertz.

12. (original) The system of claim 11, wherein said passbands have widths that do not substantially exceed 10 megahertz.

13. (original) The system of claim 10, wherein said two-conductor medium is a coaxial cable.

14. (original) The system of claim 10, wherein said two-conductor medium is a twisted pair.

15. (original) The system of claim 10, wherein the transmitter of each of said transceivers further includes a combiner that couples said transmit filters to said amplifier.

16. (original) The system of claim 10, wherein said medium comprises a plurality of medium branches and further including at least one hub transceiver that couples said branches together and amplifies said data signals.

17. (currently amended) A data communication system for communicating data signals, comprising:

a coaxial cable network;

sets of filters ~~that have~~ wherein the filters of each of said sets have a passband[[s]] that defines a respective communication channel[[s]] in the frequency region below 1000 megahertz; and

a plurality of transceivers that each include;

a) a receiver that has a filter of each of said sets coupled to said cable network to receive said data signals; and

b) a transmitter that has an amplifier and a filter of each of said sets that is coupled by said amplifier to said cable network to transmit said data signals;

said transceivers thereby enabled to communicate said data signals over the respective communication channels of said sets.

18. (original) The system of claim 17, wherein said cable network forms cable branches and further including at least one hub transceiver that couples said cable branches together and amplifies said data signals.

19. (original) The system of claim 17, wherein said passbands have widths that do not substantially exceed 10 megahertz.

20. (original) A method of communicating data signals, comprising the steps of:

transmitting data signals to a two-conductor medium through transmit filters whose passbands define respective and different communication channels in the frequency region below 1000 megahertz; and

receiving data signals from said medium through a plurality of receive filters
whose passbands substantially match respective ones of said transmit
filters.

21. (original) The method of claim 20, further including the step of
amplifying said data signals prior to said transmitting step.

22. (original) The method of claim 20, wherein said two-conductor medium
is a cable network that forms cable branches and further including the step of
amplifying said data signals as they pass between said cable branches.